



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
WASHINGTON, DC 20460

OFFICE OF CHEMICAL SAFETY
AND POLLUTION PREVENTION

March 18, 2020

Jane Miller
Agent for AlzchemTrostberg GmbH.
c/o Biologic Consulting, Inc.
10529 Heritage Bay Blvd.
Naples, FL 34120

Subject: PRIA Label Amendment – Adding new non-food uses of hydrogen cyanamide on almond and pistachio. Removal of restriction of non-desert-grown grapes to San Joaquin Valley. Update to company name. Incorporation of Registration Review Interim Decision label mitigation.
Product Name: Dormex
EPA Registration Number: 54555-2
Application Date: 7/12/2017, 7/12/2018, and 9/13/2018
Decision Number: 543178, 560436, and 544419

Dear Ms. Miller:

The application referred to above, submitted in connection with registration under the Federal Insecticide, Fungicide and Rodenticide Act, as amended, is acceptable under FIFRA Section 3(c)(7)(B), subject to the following conditions:

1. You must submit and/or cite all data required for registration/reregistration/registration review of your product under FIFRA when the Agency requires all registrants of similar products to submit such data.
2. The Agency has noted certain deficiencies in the data supporting hydrogen cyanamide. Specific gaps are identified in the Hydrogen Cyanamide Registration Review Interim Decision, available in docket EPA-HQ-OPP-2007-1014.

These data gaps are related to the active ingredient and not specifically these new uses. No deadline has been set for submission these required data to the Agency.

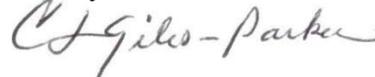
The Agency, in accordance with the Federal Insecticide, Fungicide and Rodenticide Act (FIFRA), as amended, has completed reviewing all of the information submitted with your application to support the Registration Review of the above referenced product in connection with the Hydrogen Cyanamide Final and/or Interim Decision, and has concluded that your submission is acceptable.

A stamped copy of your labeling is enclosed for your records. This labeling supersedes all previously accepted labeling. You must submit one (1) copy of the final printed labeling before you release the product for shipment with the new labeling. In accordance with 40 CFR 152.130(c), you may distribute or sell this product under the previously approved labeling for 12 months from the date of this letter. After 12 months, you may only distribute or sell this product if it bears this new revised labeling or subsequently approved labeling. "To distribute or sell" is defined under FIFRA section 2(gg) and its implementing regulation at 40 CFR 152.3.

Should you wish to add/retain a reference to the company's website on your label, then please be aware that the website becomes labeling under the Federal Insecticide Fungicide and Rodenticide Act and is subject to review by the Agency. If the website is false or misleading, the product would be misbranded and unlawful to sell or distribute under FIFRA section 12(a)(1)(E). 40 CFR 156.10(a)(5) list examples of statements EPA may consider false or misleading. In addition, regardless of whether a website is referenced on your product's label, claims made on the website may not substantially differ from those claims approved through the registration process. Therefore, should the Agency find or if it is brought to our attention that a website contains false or misleading statements or claims substantially differing from the EPA approved registration, the website will be referred to the EPA's Office of Enforcement and Compliance.

Your release for shipment of the product constitutes acceptance of these conditions. If you fail to satisfy these data requirements, EPA will consider appropriate regulatory action including, among other things, cancellation under FIFRA section 6(e). If you have any questions, please contact Lindsay Roe by phone at 703-347-0506, or via email at roe.lindsay@epa.gov.

Sincerely,



Cynthia Giles-Parker, Chief
Fungicide Branch
Registration Division (7505P)

Enclosure – stamped "accepted" label

RESTRICTED USE PESTICIDE

Due to corrosive effects to eyes and skin.
For retail sale to and use only by Certified Applicators or persons under their direct supervision and only for those uses covered by the Certified Applicator's Certification.

A growth regulator to stimulate uniform budbreak in certain crops.

DORMEX®

ACTIVE INGREDIENT	BY WEIGHT
Hydrogen Cyanamide.....	50.0%
OTHER INGREDIENTS.....	50.0%
TOTAL.....	100.0%

4.4 LBS. ACTIVE INGREDIENT PER GALLON

**KEEP OUT OF REACH OF CHILDREN
DANGER – PELIGRO**

Si usted no entiende la etiqueta, busque a alguien para que se la explique a usted en detalle.
(If you do not understand this label, find someone to explain it to you in detail.)

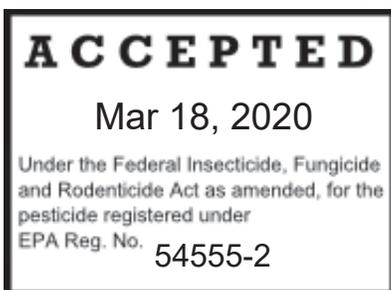
FIRST AID	
If on skin or clothing	<ul style="list-style-type: none">• Take off contaminated clothing.• Rinse skin immediately with plenty of water for 15-20 minutes.• Call poison control center or doctor for treatment advice.
If inhaled	<ul style="list-style-type: none">• Move person to fresh air.• If person is not breathing, call 911 or an ambulance, then give artificial respiration, preferably mouth-to-mouth, if possible.• Call a poison control center or doctor for further treatment advice.
If in eyes	<ul style="list-style-type: none">• Hold eye open and rinse slowly and gently with water for 15-20 minutes.• Remove contact lenses, if present, after the first 5 minutes, then continue rinsing eye.• Call a poison control center or doctor for treatment advice.
If swallowed	<ul style="list-style-type: none">• Call poison control center or doctor immediately for treatment advice.• Have person sip a glass of water if able to swallow.• Do not induce vomiting unless told to do so by a poison control center or doctor.• Do not give anything by mouth to an unconscious person.
HOT LINE NUMBER	
Have the product container or label with you when calling a poison control center or doctor or going for treatment. For emergency information concerning this product call the poison control center at 1-800-222-1222.	
NOTE TO PHYSICIAN	
Immediate lavage of stomach. Hydrogen cyanamide is not hydrogen cyanide and does not degrade to hydrogen cyanide. Do not induce vomiting or give anything by mouth to an unconscious person.	

[Optional referral statements when booklets and container labels are used:

See Additional Precautionary Statements [and Directions for Use] [on] [Side] [Back] [Panel] [in Booklet]
See label booklet for complete [Precautionary Statements,] Directions For Use and Storage and Disposal.]

EPA REG. No. 54555-2

EPA EST. No. XXX-XXX-XXX



MANUFACTURED BY:
AlzChem Trostberg GmbH
Dr.-Albert-Frank-Str. 32
D-83308 Trostberg, Germany

BATCH NO.

NET CONTENTS GALS. LITERS

PRECAUTIONARY STATEMENTS
Hazards to Humans and Domestic Animals
DANGER

Corrosive. Causes skin burns. Causes substantial but temporary eye injury. May be fatal if swallowed, inhaled or absorbed through the skin. Do not get on skin, in eyes or on clothing. Prolonged or frequently repeated skin contact may cause allergic reactions in some individuals. Avoid exposure to this material or its spray drift if a skin rash develops. Wash thoroughly with soap and water after handling and before eating, drinking, chewing gum, or using tobacco. Do not consume alcoholic beverages prior to, during, and for 24 hours following the handling of this product.

PERSONAL PROTECTIVE EQUIPMENT (PPE)

Mixers and loaders using the required closed system must wear:

- Long-sleeved shirt and long pants
- Shoes plus socks
- Chemical-resistant apron
- Chemical-resistant gloves such as Barrier Laminate, or Butyl rubber \geq 14 mils, or Nitrile Rubber \geq 14 mils, or Neoprene Rubber \geq 14 mils, or Polyvinyl Chloride (PVC) \geq 14 mils, or Viton \geq 14 mils
- Protective eyewear - persons who mix, load or transfer must wear goggles. A full-faced respirator may be substituted for goggles.

All handlers cleaning equipment must wear:

- Chemical-resistant gloves such as Barrier Laminate, or Butyl rubber \geq 14 mils, or Nitrile Rubber \geq 14 mils, or Neoprene Rubber \geq 14 mils, or Polyvinyl Chloride (PVC) \geq 14 mils, or Viton \geq 14 mils
- Chemical-resistant footwear plus socks
- Protective eyewear
- Chemical-resistant protective suit
- Wear a minimum of a NIOSH-approved particulate filtering facepiece respirator with any N, R, or P filter; OR a NIOSH approved elastomeric particulate respirator with any N, R, or P filter; OR a NIOSH-approved powered air purifying respirator with HE filters.

Applicators using the required enclosed cabs must wear:

- Long-sleeved shirt and long pants
- Shoes plus socks

Applicators using the required enclosed cabs must have the following equipment immediately available and stored in a chemical-resistant container, such as a plastic bag. The following must be worn if it is necessary to exit the cab and contact pesticide treated surfaces in the treated area, and must be removed and stored in a chemical-resistant container before reentering the cab:

- Chemical-resistant protective suit
- Chemical-resistant gloves such as Barrier Laminate, or Butyl rubber \geq 14 mils, or Nitrile Rubber \geq 14 mils, or Neoprene Rubber \geq 14 mils, or Polyvinyl Chloride (PVC) \geq 14 mils, or Viton \geq 14 mils
- Chemical-resistant footwear plus socks
- Wear a minimum of a NIOSH-approved particulate filtering facepiece respirator with any N, R, or P filter; OR a NIOSH approved elastomeric particulate respirator with any N, R, or P filter; OR a NIOSH-approved powered air purifying respirator with HE filters.
- Protective eyewear

USER SAFETY REQUIREMENTS

Discard clothing and other absorbent materials that have been drenched or heavily contaminated with this product's concentrate. Do not reuse them. Follow manufacturer's instructions for cleaning/maintaining PPE. If instructions for washables are not available, use detergent and hot water. Keep and wash PPE separately from other laundry. Wash PPE after each day's use.

ENGINEERING CONTROLS STATEMENT

CLOSED SYSTEMS: This product must be mixed, loaded, and transferred only in a closed system.

CLOSED SYSTEMS AND ENCLOSED CAB REQUIREMENTS: This product must be applied only with the applicator in an enclosed cab. When handlers use closed systems or enclosed cabs in a manner that meets the requirements listed in the Worker Protection Standard (WPS) for agricultural pesticides {40 CFR 170.240(d)(4-6)}, the handler PPE requirements may be reduced or modified as specified in the WPS.

IMPORTANT: When reduced PPE is worn because a closed system is being used, handlers must be provided all PPE specified above for “applicators and other handlers” and have such PPE immediately available for use in an emergency, such as a spill or equipment break-down.

The operating pressure of the spray rig shall be no more than 40 psi with the use of low pressure nozzles on dilute boom sprayers and no more than 100 psi on airfan sprayers. Airfan sprayers should have the fan adjusted so that the spray mist does not greatly exceed the height of the treated crop.

USER SAFETY RECOMMENDATIONS

Users should:

- Wash hands before eating, drinking, chewing gum, using tobacco, or using the toilet.
- Remove clothing immediately if pesticide gets inside. Then wash thoroughly and put on clean clothing.
- Remove PPE immediately after handling this product. Wash the outside of gloves before removing. As soon as possible, wash thoroughly and change into clean clothing.
- Avoid contact with spray contaminated surfaces.

ENVIRONMENTAL HAZARDS

Do not apply this product to any area in which an endangered species has been identified or in such a manner that drift from applications of this product could result in destroying an endangered species. This limitation applies only to areas that have been identified by and are protected by State and Federal agencies.

This pesticide is highly toxic to freshwater invertebrates and moderately toxic to birds and mammals. Drift and runoff may be hazardous to aquatic organisms in neighboring areas. Do not apply when weather conditions favor drift from treated areas or where runoff is likely to occur. Do not apply this product within 300 yards of the mean high water mark for intertidal areas, surface waters, rivers, streams, or their flowing tributaries. Do not contaminate water by the cleaning of equipment or disposal of equipment washwater or rinsate. Do not spray when bees are active in the field.

This chemical can contaminate surface waters by direct application, spray drift, or by its potential to runoff through ground spray applications. Under some conditions it may also have a high potential for runoff into surface water after application. These include poorly draining or wet soils with readily visible slopes toward adjacent surface waters, frequently flooded areas, areas overlaying extremely shallow ground water, areas with in-field canals or ditches that drain to surface water, areas not separated from adjacent surface waters by vegetated filter strips, and areas overlaying tile drainage systems that drain to surface water.

DIRECTIONS FOR USE

It is a violation of federal law to use this product in a manner inconsistent with its labeling.

Do not apply this product in a way that will contact workers or other persons, either directly or through drift. For any requirements specific to your State or Tribe, consult the agency responsible for pesticide regulation.

Read the “Conditions of Sale” on the **Dormex** label before using this product. If the terms in the “Conditions of Sale” are not acceptable, return the product unopened at once.

RESTRICTIONS:

- Aerial application of **Dormex** is prohibited.
- Do not apply this product through any type of irrigation system.
- Do not use **Dormex** as a blossom thinner under any conditions.
- This product must be mixed, loaded, and transferred only in a closed system.

- In addition to the buffers required in the Environmental Hazards section, do not apply this product within 300 yards of any surface water that may be used as a source of drinking water.
- Only protected handlers or protected supervisors may be in the area during application.
- During the application, no person shall be within 125 feet of the area to be treated unless involved in application or mix/load operations.

AGRICULTURAL USE REQUIREMENTS

Use this product only in accordance with its labeling and with the Worker Protection Standard, 40 CFR 170. This Standard contains requirements for the protection of agricultural workers on farms, forests, nurseries, and greenhouses, and handlers of agricultural pesticides. It contains requirements for training, decontamination, notification, and emergency assistance. It also contains specific instructions and exceptions pertaining to the statements on this label about personal protective equipment (PPE), notification to workers, and restricted-entry intervals. The requirements in this box only apply to uses of this product that are covered by the Worker Protection Standard.

Do not enter or allow worker entry into treated areas during the restricted entry interval (REI) of 24 hours.

PPE required for early entry to treated areas that is permitted under the Worker Protection Standard and that involves contact with anything that has been treated, such as plants, soil or water, is:

- Chemical-resistant protective suit
- Chemical-resistant gloves, such as Barrier Laminate, or Butyl Rubber \geq 14 mils, or Nitrile Rubber \geq 14 mils, or Neoprene Rubber \geq 14 mils, or Polyvinyl Chloride (PVC) \geq 14 mils, or Viton \geq 14 mils
- Chemical-resistant footwear plus socks
- Protective eyewear
- Chemical-resistant headgear for overhead exposure.

Notify workers of the application by warning them orally and by posting warning signs at entrances to treated areas.

PRODUCT INFORMATION

Dormex is a soluble concentrate plant growth regulator that will stimulate more uniform budbreak on many deciduous plants. More uniform budbreak will occur in plants that have received their full chill hour requirement or somewhat less than their full dormancy. Promoting more uniform budbreak in the spring can have significant benefit in promoting more uniform flowering and more uniform maturity at harvest. **Dormex** may be applied by groundboom and airblast spray methods. The following provides directions on how to achieve these benefits and how to avoid possible difficulties in the use of **Dormex**.

This label must be in possession of the user at the time of **Dormex** application.

USE PRECAUTIONS

Cover Crops – When spraying **Dormex** in areas of vineyards or orchards with cover crops, injury may occur from spray applications to the target crop. This injury is usually temporary, but some crops may be sensitive and be defoliated. If there is concern about the cover crop, a test spray of a small area over the cover crop to test the plant sensitivity to **Dormex** using the intended surfactant is recommended.

Environmental and Disease Stress – Plants grown in heavy soils, or in other soils affected by poor drainage, or soil borne diseases, such as phytophthora root rot, may die back as a result of treatment with **Dormex**. This is due to increased uniform budbreak and the inability of the plant to sustain growth. Plants usually appear healthy and begin to grow normally, then collapse. Plants designated for treatment with **Dormex** need a healthy, viable root system.

Potential Crop Loss - Users of **Dormex** are advised that drift to crops that are in bloom may completely remove or damage all of the flowers, resulting in complete crop loss. When spraying close to susceptible crops (*i.e.* lemons), crops in bloom, sensitive foliage, etc., a buffer zone is suggested to be used. Extreme care must be used to avoid contact of the spray or drift with foliage, green stems, or fruit of desirable crops since severe damage and crop loss may result.

The use of **Dormex** may result in the formation of ethylene gas. When **Dormex** is applied to grapes growing close to certain lemon varieties the ethylene gas may in turn result in some leaf drop in lemon leaves. This defoliation is characterized by the leaf lamina falling off leaving the leaf petiole still attached to the stem. Application of lime at 125 lbs. in 250-300 gal. water per acre (having a high pH, *i.e.* 10+), applied 2 to 24 hours after **Dormex** application, may result in reduced formation of ethylene gas.

SPRAY DRIFT MANAGEMENT

Avoid spraying under conditions of a temperature inversion when drift hazard is increased. Coarse sprays, as defined by the ASABE S572.1 must be used in **Dormex** applications. To limit drift, use a coarse droplet nozzle with nozzle pressure not to exceed 40 psi for dilute boom sprayers and 100 psi for airfan sprayers, and spray only to wet. It is important to understand that the responsibility for control of spray drift is with the person making the use recommendation, the applicator and the grower.

Spray equipment used for **Dormex** application should be thoroughly cleaned of residual spray materials. Residual spray in the tank or sprayer plumbing may react with **Dormex**, potentially reducing the effective concentration of **Dormex**. Sprays containing metal ions, particularly copper, will form a black insoluble salt that will coat the sprayer and be difficult to remove. More importantly, this reaction will reduce the available active ingredient concentration.

RESTRICTIONS:

- Do not use nozzles or nozzle configurations which generate fine spray droplets.
- Do not increase spray volume by increasing nozzle pressure because this will increase the number of fine droplets in the spray.

Spray Equipment Calibration – When calibrating spray equipment, especially speed sprayers, it is critical that equipment be calibrated for the row spacing to be treated. Double spraying and excessive drift through the orchard will result in phytotoxicity. Proper speed sprayer calibration and/or reduction of rate will provide a good result.

APPLICATION INSTRUCTIONS AND TIMING

Dormancy Requirements – To promote the maximum effectiveness of **Dormex** and to avoid phytotoxicity (i.e., new wood dieback, blossom thinning), deciduous crops must be completely dormant. **Dormex** is not a substitute for a lack of dormancy. Care should be taken to monitor dormancy. This is most easily accomplished by monitoring chill hour accumulation. Negative chill hour accumulation, climatologically induced incomplete dormancy must be considered, both to promote the effectiveness of **Dormex** at the labeled rates of application and to avoid phytotoxicity.

Dormant sprays containing oil should not be made closer than 14 days before or after **Dormex** application (delayed dormant applications are preferred). Some new wood dieback may result if oil is applied closer than this interval. When oil and copper spray mixtures must be used for insect and/or disease control, **Dormex** should be applied 30 or more days before normal budbreak and the oil and/or copper spray should be made as a delayed dormant spray, which coincides with early budbreak. This practice will give three or more weeks separation. Early dormant sprays containing copper should not be followed by **Dormex** by less than 30 days or the effect of the copper spray may be reduced.

If applied less than 30 days (35 to 40 days for apples) prior to natural budbreak, yield may be reduced. Use the minimum spray volume to achieve adequate wetting of all buds.

Frost Precaution – For earlier than normal budbreak, make the application sooner than 30 days prior to normal budbreak. In determining whether or not to apply **Dormex** to promote earlier than normal budbreak, the user should be aware that growing buds and shoots are susceptible to frost and may be killed or damaged by freezing temperatures. Following application, some yellowing on the first leaves may appear but the developing growth will be normal.

RESTRICTIONS:

- Do not exceed 4 gallons per acre of **Dormex** per application.
- Do not apply more than 4 gallons of **Dormex** (17.6 lbs. hydrogen cyanamide) per acre per year.
- Make only one application per year.
- Do not tank mix with other materials except as listed on this label.
- Do not use concentrate spray.

CROPS

ALMONDS

For more uniform bud break, apply 4 gallons of **Dormex** in not more than 200 gallons of spray per acre using a non-ionic surfactant not to exceed 0.5% (v/v). Spray application should be made 30 days or more prior to anticipated bud break. Spray application should be made according to the anticipated bud break timing required by the earliest variety within an inter-planted orchard. Maintain fungicide/bactericide spray activities, including dormant sprays, and protect bud growth as it occurs.

If Dormex is applied less than four weeks prior to natural bud break, yield may be reduced. Low vigor and low capacity trees should not have Dormex applied any earlier than 30 days prior to anticipated normal bud break. Trees treated too soon risk reduced yield if conditions affecting growth following application are not favorable for a sustained period. If sufficient coverage on very large trees cannot be achieved with 200 gallons of spray per acre, do not use Dormex. Some yellowing on the first leaves may appear but the developing growth will be normal.

RESTRICTIONS:

- Do not apply more than 4 gallons of **Dormex** (17.6 lbs. hydrogen cyanamide) per acre per year.
- Do not exceed 200 gallons of spray per acre.
- Make only one application per year.
- Do not tank mix with other materials except as listed above

APPLES

To promote more uniform budbreak, after all pruning activities are completed, apply 4 gallons of **Dormex** in not more than 200 gallons spray per acre using a nonionic surfactant not to exceed 0.5% (v/v), 30 days before normal bud swell, or 35 days before normal budbreak. In orchards having more than one variety, spray according to anticipated budbreak timing of the earliest variety in an interplanted orchard, unless each variety can be sprayed separately without significant drift or overspray contacting previously sprayed varieties or nontarget varieties.

When budbreak begins to occur, the bloom period can be compressed to a few days depending upon the weather. In order to assure proper pollination, a sufficient number of beehives of suitable strength to assure adequate pollination must be set in the orchard before first blossom activity is observed. Artificial pollination may be advised when bee activity is limited. Increased budbreak uniformity will also facilitate chemical thinning of fruit and promote greater uniformity of fruit maturity at harvest.

Dormex is a budbreak stimulant and will promote more uniform normal and/or earlier budbreak even when the maximum chill hour requirements are met. **Dormex** is not a substitute for chill hours.

RESTRICTIONS:

- Do not apply more than 4 gallons of **Dormex** (17.6 lbs. hydrogen cyanamide) per acre per year.
- Do not exceed 200 gallons of spray per acre.
- Make only one application per year.
- Do not tank mix with other materials except as listed above

BLACKBERRIES

To promote more uniform budbreak apply 3 gallons of **Dormex** in 50 to 100 gallons of spray per acre. Thoroughly wet all plants using 0.25% to 0.5% (v/v) of nonionic surfactant. Application should be made 30 days or more before normal budbreak and before new green growth appears. Budbreak and the rate of foliage and flower development are increased by **Dormex** even though full dormancy may not have been met. The more chill hours that can be accumulated, generally the better the bloom and fruit set.

Since **Dormex** typically advances budbreak, the risk of Spring freeze damage is increased. **Dormex** has not been tested on all varieties, but the following varieties have shown good results: Arapaho, Navaho and Apache blackberries. If **Dormex** is to be used on other varieties, small areas should be treated first to determine each variety's reaction to **Dormex**.

RESTRICTIONS:

- Do not apply more than 3 gallons of **Dormex** (13.2 lbs. hydrogen cyanamide) per acre per year.
- Do not exceed 100 gallons of spray per acre.
- Make only one application per year.
- Do not tank mix with other materials except as listed above

BLUEBERRIES

To promote more uniform budbreak, particularly in areas of marginal chilling and to promote more uniform harvest, apply 1½ to 3 gallons of **Dormex** in 50 to 100 gallons of spray per acre to provide full coverage. Use a nonionic surfactant not to exceed 0.5% (v/v) with applications made 30 or more days prior to natural flower and vegetative budbreak.

Some varieties growing in low or no chill areas benefit from burning off last year's foliage. The higher rate is required when the last year foliage is to be burned off. In order to promote sufficient budbreak of the current year's buds, both reproductive and vegetative, care must be taken to determine the effects of the higher rates on varieties, even those where burning off last year's foliage has been shown to be desirable.

It is the grower's responsibility to identify varieties that are tolerant of the higher rates before any larger acreage is treated. To do this, take a small group of plants to be treated at the appropriate use rates (as indicated above) under the anticipated growing conditions and observe for phytotoxic symptoms before treating a large number of plants.

IMPORTANT: In the State of Florida use of **Dormex** in Alachua County, Florida is restricted from the area west of route 441, except that north of the intersection of route 441 and 175, use is also restricted west of 175 because of possible effects on the squirrel chimney cave shrimp *Palaemonetes cummingi*.

RESTRICTIONS:

- Do not apply more than 3 gallons of **Dormex** (13.2 lbs. hydrogen cyanamide) per acre per year.
- Do not exceed 100 gallons of spray per acre.
- Make only one application per year.
- Do not tank mix with other materials except as listed above

CHERRIES

For more uniform natural budbreak, or for earlier budbreak leading to more uniform normal maturity or earlier maturity, apply after all pruning activities are complete. Apply 4 gallons of **Dormex** in not more than 200 gallons of spray per acre using a nonionic surfactant not to exceed 0.5% (v/v). If sufficient spray coverage cannot be achieved on very large trees with 200 gallons spray per acre, do not use **Dormex**. Applications should be made 30 or more days prior to normal budbreak. Spray applications should be made according to the anticipated budbreak timing required by the earliest variety within an interplanted orchard, unless each variety can be sprayed separately without significant drift or over-spray contacting previously sprayed varieties or non-target varieties. Maintain fungicide/bactericide spray activities, including dormant sprays, and protect bud growth as it occurs.

When budbreak begins to occur following application of **Dormex**, the bloom can be compressed to a few days, depending upon the weather. In order to assure proper pollination, a sufficient number of beehives of suitable strength to assure adequate pollination must be set in the orchard before first bloom activity is observed. Artificial pollination may be advised when bee activity is limited.

Dormex is a budbreak stimulant and will promote more uniform normal and/or earlier budbreak even when the maximum chill hour requirements are met. However, **Dormex** is not a substitute for chill hours.

RESTRICTIONS:

- Do not apply more than 4 gallons of **Dormex** (17.6 lbs. hydrogen cyanamide) per acre per year.
- Do not exceed 200 gallons of spray per acre.
- Make only one application per year.
- Do not tank mix with other materials except as listed above

GRAPES

For promoting increased budbreak uniformity, and to promote more uniform harvest, apply 4 gallons of **Dormex** in not more than 100 gallons of spray per acre using a nonionic surfactant not to exceed 0.5% (v/v) applied 30 or more days prior to normal natural budbreak after all pruning activities are completed, including tying of canes. Use a coarse droplet spray with nozzle pressure not to exceed 40 psi, and a minimum number of spray nozzles to achieve adequate wetting. Three to four nozzles are usually sufficient. This use will help overcome blind bud disorder on such wine varieties as Cabernet Sauvignon. In areas where chill hour accumulation is marginal, **Dormex** should be applied as late as possible to permit maximum chill hour accumulation, but not later than 25 days before budbreak.

In determining to apply **Dormex** to promote earlier than normal budbreak, the user should be aware that growing buds and shoots are susceptible to frost and may be killed or damaged by freezing temperatures. If applied less than four weeks prior to natural budbreak, yield may be reduced. Low vigor and low capacity vines should not have **Dormex** applied any earlier than 30 days prior to anticipated normal budbreak. Vines treated too soon risk reduced yield if conditions affecting growth following application are not favorable for a sustained period.

Desert Grown Grapes

For use in desert grown grapes in California Counties of Imperial, Riverside and San Bernardino and in Arizona Counties of Maricopa, Pinal and Yuma. For earlier than normal budbreak, make the application earlier than 4 weeks prior to normal budbreak not before December 1 or later than January 31. Some yellowing on the first leaves may appear but the developing growth will be normal. To avoid possible exposure to the endangered Coachella Valley fringe-toed lizard in the vineyards located within boundaries of the Coachella Valley Preserve, applications may not be made within 50 feet of the boundary of the Coachella Valley Preserve.

Non-Desert Grown Grapes

For earlier than normal budbreak, make the application earlier than 4 weeks prior to normal budbreak but not before January 1 or later than February 28. Some yellowing on the first leaves may appear but the developing growth will be normal.

RESTRICTIONS:

- Do not apply more than 4 gallons of **Dormex** (17.6 lbs. hydrogen cyanamide) per acre per year.
- Do not exceed 100 gallons of spray per acre.
- Make only one application per year.
- Do not tank mix with other materials except as listed above

KIWI

To promote more uniform natural budbreak or earlier budbreak, particularly in areas of marginal chilling, to reduce the period of fruit susceptibility to disease, and to promote more uniform harvest, apply 4 gallons of **Dormex** in not more than 100 gallons of spray per acre using a nonionic surfactant not to exceed 0.5% (v/v). This application will also reduce the canes' susceptibility to apical dominance, therefore increasing bud fruitfulness. If applied less than four weeks prior to natural budbreak, yield may be reduced.

For earlier than normal budbreak, make the application earlier than four weeks prior to normal budbreak. Use a coarse droplet spray with nozzle pressure not to exceed 40 psi, and a minimum number of spray nozzles to achieve adequate wetting. Some yellowing on the first leaves may appear but the developing growth will be normal. In determining to apply **Dormex** to promote earlier than normal budbreak the user should be aware that growing buds and shoots are susceptible to frost and may be killed or damaged by freezing temperatures.

RESTRICTIONS:

- Do not apply more than 4 gallons of **Dormex** (17.6 lbs. hydrogen cyanamide) per acre per year.
- Do not exceed 100 gallons of spray per acre.
- Make only one application per year.
- Do not tank mix with other materials except as listed above

PEACHES/NECTARINES (Not for Use in California)

For more uniform natural budbreak, or for earlier budbreak, leading to sharper bloom, more uniform maturity or earlier maturity, apply after all pruning activities are completed, apply 1 to 1½ gallons of **Dormex** in not more than 200 gallons spray per acre using a non-ionic surfactant not to exceed 0.5% (v/v). Application should be made 30 or more days prior to normal budbreak. Application less than 30 days prior to normal budbreak may result in reduced yield. In some areas, it may be possible to use lower rates if it is possible to monitor closely the accumulation of chill hours. If rates are too low and made too close to normal budbreak no results may occur.

Spray according to the anticipated budbreak timing of the earliest variety within an interplanted orchard, unless each variety can be sprayed separately without significant drift of overspray contacting previously sprayed varieties or nontarget varieties.

Dormex is a budbreak stimulant and will promote more uniform and/or earlier budbreak even when maximum chill hour requirements are met. However, **Dormex** is not a substitute for chill hours.

Dormex use on any orchard historically damaged by frost, such as in Southeastern states must be done with the knowledge that **Dormex** treated trees are equally as frost sensitive as non-treated trees. If **Dormex** is used to start growth even a few days early, resulting flowers and/or fruit can be subject to frost damage.

Application at rates in excess of those stated above may reduce emergence of primary buds, causing secondary bud growth which can reduce yield in the immediate crop cycle.

RESTRICTIONS:

- Do not apply more than 1 ½ gallons of **Dormex** (6.6 lbs. hydrogen cyanamide) per acre per year.
- Do not exceed 200 gallons of spray per acre.
- Make only one application per year.
- Do not tank mix with other materials except as listed above

PISTACHIOS

For more uniform bud break, apply 4 gallons of Dormex in not more than 200 gallons of spray per acre using a non-ionic surfactant not to exceed 0.5% (v/v). Spray application should be made 30 days or more prior to anticipated bud break. Spray application should be made according to the anticipated bud break timing required by the earliest variety within an inter-planted orchard. Maintain fungicide/bactericide spray activities to protect bud growth as it occurs.

If applied less than four weeks prior to natural bud break, yield may be reduced. Low vigor and low capacity trees should not have Dormex applied any earlier than 30 days prior to anticipated normal bud break. Some yellowing on the first leaves may appear but the developing growth will be normal.

RESTRICTIONS:

- Do not apply more than 4 gallons of **Dormex** (17.6 lbs. hydrogen cyanamide) per acre per year.
- Do not exceed 200 gallons of spray per acre.
- Make only one application per year.
- Do not tank mix with other materials except as listed above

STORAGE AND DISPOSAL

PROHIBITIONS: Do not contaminate water, food, or feed by storage or disposal.

PESTICIDE STORAGE: Keep under cool conditions, not to exceed 20°C (68°F). Do not store in direct sunlight. Keep pesticide in original container.

PESTICIDE DISPOSAL: Wastes resulting from the use of this product may be disposed of on site or at an approved waste disposal facility. Open dumping is prohibited.

CONTAINER DISPOSAL: Non-refillable containers. Do not reuse or refill this container. Triple rinse or pressure rinse container (or equivalent) promptly after emptying. Then offer for recycling or reconditioning, or puncture and dispose of in a sanitary landfill, or by incineration, or, if allowed by state and local authorities, by burning. If burned, stay out of smoke.

Non-refillable container less than or equal to 5 gallons: Triple rinse as follows: Empty the remaining contents into application equipment or a mix tank and drain for 10 seconds after the flow begins to drip. Fill the container 1/4 full with water and recap. Shake for 10 seconds. Pour rinsate into application equipment or a mix tank or store rinsate for later use or disposal. Drain for 10 seconds after the flow begins to drip. Repeat this procedure two more times.

Non-refillable container greater than 5 gallons: Triple rinse as follows: Empty the remaining contents into application equipment or a mix tank and drain for 10 seconds after the flow begins to drip. Fill the container 1/4 full with water. Replace and tighten closures. Tip container on its side and roll it back and forth, ensuring at least one complete revolution, for 30 seconds. Stand the container on its end and tip back and forth several times. Turn the container over on its other end and tip back and forth several times. Empty the rinsate into application equipment or a mix tank or store rinsate for later use or disposal. Repeat this procedure two more times.

Pressure rinse as follows (all sizes): Empty the remaining contents into application equipment or a mix tank and continue to drain for 10 seconds after the flow begins to drip. Hold container upside down over application equipment or mix tank or collect rinsate for later use or disposal. Insert pressure rinsing nozzle in the side of the container and rinse at about 40 PSI for at least 30 seconds. Drain for 10 seconds after the flow begins to drip.

**CONDITIONS OF SALE
IMPORTANT: READ BEFORE USE**

Read the entire Directions for Use, Conditions of Warranties, and Limitations of Liability before using this product. If terms are not acceptable, return the unopened product container at once.

By using this product, user or buyer accepts the following Conditions, Disclaimer of Warranties and Limitations of Liability.

CONDITIONS: The directions for use of this product are believed to be adequate and must be followed carefully. However, it is impossible to eliminate all risks associated with the use of this product. Crop injury, ineffectiveness or other unintended consequences may result because of such factors as weather conditions, presence of other materials, or the manner of use or application, all of which are beyond the control of AlzChem Trostberg GmbH. To the extent consistent with applicable law, all such risks shall be assumed by the user or buyer.

DISCLAIMER OF WARRANTIES: To the extent consistent with applicable law, AlzChem Trostberg GmbH makes no other warranties, express or implied, of merchantability or fitness for a particular purpose or otherwise, that extend beyond the statements made on this label. No agent of AlzChem Trostberg GmbH is authorized to make any warranties beyond those contained herein or to modify the warranties contained herein. To the extent consistent with applicable law, AlzChem Trostberg GmbH disclaims any liability whatsoever for special, incidental or consequential damages resulting from the use or handling of this product.

LIMITATIONS OF LIABILITY: To the extent consistent with applicable law, the exclusive remedy of the user or buyer for any and all losses, injuries or damages resulting from the use or handling of this product, whether in contract, warranty, tort, negligence, strict liability or otherwise, shall not exceed the purchase price paid or at AlzChem Trostberg GmbH election, the replacement of product.